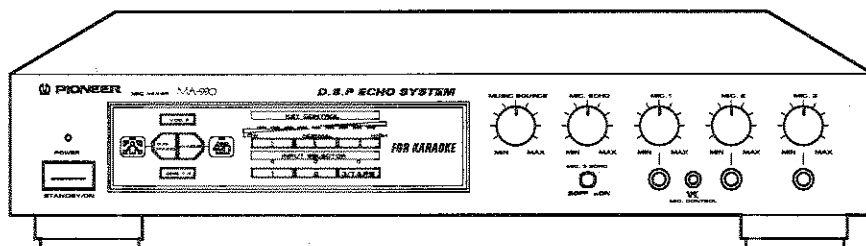


MA-990

MIC. MIXER
MEZCLADOR DE MICRÓFONO
麥克風混音機



English

Español

中國語

IMPORTANT



The lightning flash with arrowhead, within an equilateral triangle, is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

CAUTION

**RISK OF ELECTRIC SHOCK
DO NOT OPEN**

CAUTION:
TO PREVENT THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). NO USER-SERVICEABLE PARTS INSIDE. REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.



The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

The power switch is secondary connected and therefore does not separate the unit from mains power in standby position

INFORMATION TO USER

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Thank you for buying this Pioneer product.

Please read through these operating instructions so you will know how to operate your model properly. After you have finished reading the instructions, put them away in a safe place for future reference.

In some countries or regions, the shape of the power plug and power outlet may sometimes differ from that shown in the explanatory drawings. However, the method of connecting and operating the unit is the same.

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IMPORTANT SAFETY INSTRUCTIONS AND WARNINGS



This symbol alerts the user that important meaning concerning the operation and maintenance of this unit has been included in the paragraph.

Therefore, it should be read carefully in order to avoid any problems.

The following symbols, found through out this manual and labels on the products, alert you to potentially dangerous conditions to the operator, service personnel, or the equipment.



WARNING

This symbol refers to a hazard or unsafe practice which can result in severe personal injury or death.



CAUTION

This symbol refers to a hazard or unsafe practice which can result in personal injury or property damage.



WARNING

TO PREVENT FIRE OR SHOCK HAZARD. DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.



CAUTION

If something abnormal occurs

Such as an unusual noise or smell during use, immediately turn off the power switch. Be sure to disconnect the power cable and call for repair service.

Do not disassemble.

Never inspect the inside or remodel this machine. If the customer remodels this machine, PIONEER will no longer guarantee its performance.

Installation

Do not install in locations which are:

- Exposed to sunlight
- Near a heater or stove
- Dusty
- Have humid and have poor ventilation
- Exposed to oily smoke, steam, or heat, such as near the kitchen
- Unstable or not level

Do not damage the power cable.

- Do not pull or hold the cable with wet hands. This causes a short or electric shock.
When connecting/disconnecting the power cable, hold the AC adaptor main body.
- Do not place the power cable under the main unit or under furniture.
Do not knot the cable or walk on it; the power cable may be damaged and cause electric shock or fire.

Avoid contact with water or foreign material.

Do not allow any metal, inflammable, or liquid to fall into the machine.

Do not place a water-filled vase or glass on this machine. If foreign material or liquid drops into the machine, immediately disconnect the power cable from the outlet and call for repair service.

Do not drop.

Do not drop or strongly bump this machine.

Storage

If you do not use for a long period, turn the power switch off and disconnect the power cable from the outlet.

Daily care

Do not use benzene, thinner, or alcohol, which may damage the surface finishing.

Wipe off surface dirt with a dry cloth. If very dirty, wipe using a soft cloth moistened with diluted neutral detergent; then wipe off surface moisture using a dry cloth.

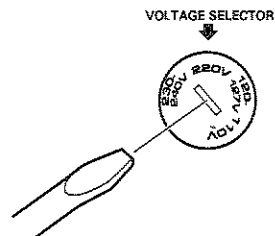
LINE VOLTAGE SELECTOR SWITCH

Only multi-voltage models are provided with this switch. U.S., Canadian, European, U.K., and Australian models are not provided with it.

Mains voltages in Saudi Arabia are 127V and 220V only. Never use this model with 110V setting in Saudi Arabia.

The line voltage selector switch is on the rear panel. Before the model is shipped from the factory, this switch is set to the power requirements of each destination. Check that it is set properly before plugging the power cord into the AC wall socket. If the switch is not properly adjusted to the voltage, or if the place of residence is changed to an area where the voltage requirements differ, adjust the selector switch as follows:

1. Use a medium-size screwdriver.
2. Insert the screwdriver into the groove on the voltage selector, and adjust the tip of the arrow so that it points to the printed voltage value for each area.



FEATURES

■ Input selector functions

Three audio inputs, including LD, VCR, and TAPE, can be selected by a single operation.

■ Three microphone input systems

With individual microphone volume control adjustable to each microphone input level.

■ Rendition of music and voice mood according to your feeling

Digital Signal Processor (DSP) installed. 'Music impression' in surround mode and 'voice impression' in chorus mode can be selected.

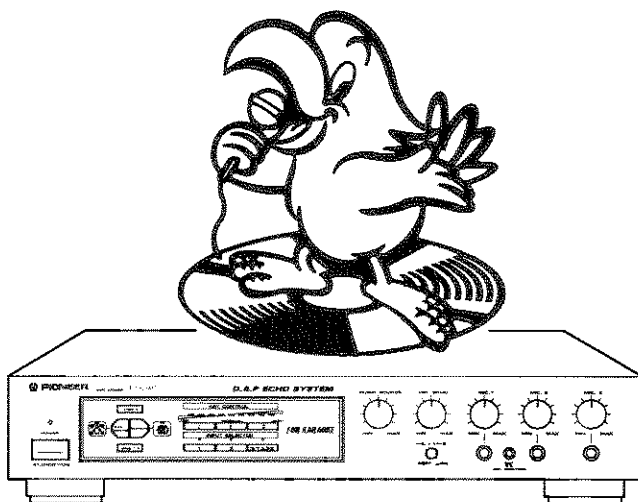
■ Digital key control function

Pitch can be controlled in a range of 9 stages by half tone without changing music speed.

■ Other karaoke functions

- ONE-TOUCH KARAOKE
- VOCAL PARTNER

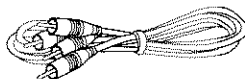
You can enjoy your music in many ways.



ACCESSORIES

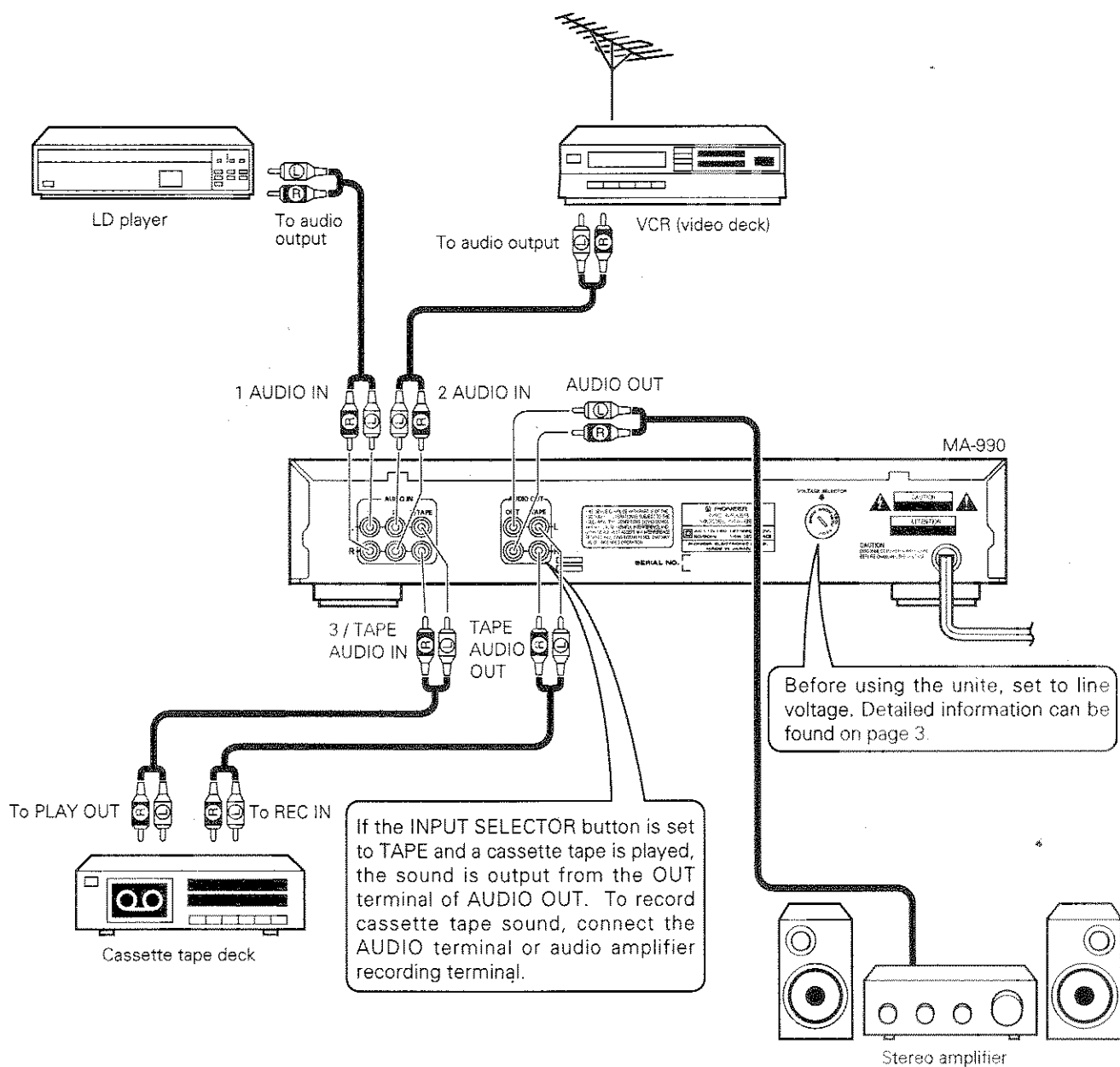
- Operating instructions x 1

- Audio cord x 1
(Red, white)



CONNECTION

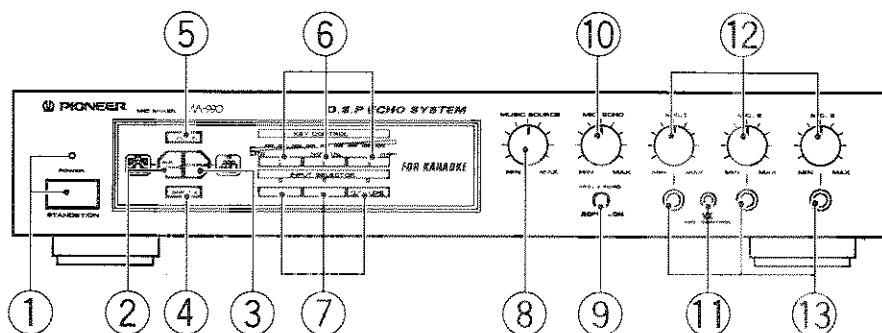
Match the color when connecting audio connection plugs and terminals to white (left audio) and red (right audio) cords.



Notes on connection

- Turn off each equipment power before connection.
- Fully insert the plug. Incomplete connection may cause noise.
- Hold the plug when disconnecting; do not pull the cord.
- When more than one piece of equipment is connected, turn off the equipment not used to prevent mutual interference.

FRONT PANEL FACILITIES



① POWER switch/indicator

Press to turn on the power and indicator. Press again to turn off the power and indicator.

② SURROUND (surround button)

Enhances the music mood.

③ CHORUS (chorus button)

Enhances the vocal mood.

④ ONE T. K.

(ONE-TOUCH KARAOKE button)

Reduces the vocal sound of non-karaoke LD and tape. When set to ON, the indicator is lit.

⑤ VOC. P. (VOCAL PARTNER button)

Reduces the playback vocal and increases your voice as the main vocal during singing with a microphone. When set to ON, the indicator is lit.

⑥ KEY CONTROL (key control button)

Enables changing the accompaniment pitch.

⑦ INPUT SELECTOR (input select button)

1, 2, and 3/TAPE audio are changed over.

⑧ MUSIC SOURCE VOLUME control

Controls sound volume of the music source.

⑨ MIC. 3 ECHO

(microphone 3 echo changeover button)

Sets echo of only microphone 3 to ON/OFF.

⑩ MIC. ECHO (digital echo control)

Adjusts the echo effect in VOCAL mode.

⑪ MIC. CONTROL

(microphone control input)

Key control can be operated from the microphone by connecting the control mini plug of PIONEER remote control karaoke microphone DM-C930, DM-C820 and DM-C530.

⑫ MIC. VOLUME control

Controls sound volume of the microphone connected to the microphone terminal.

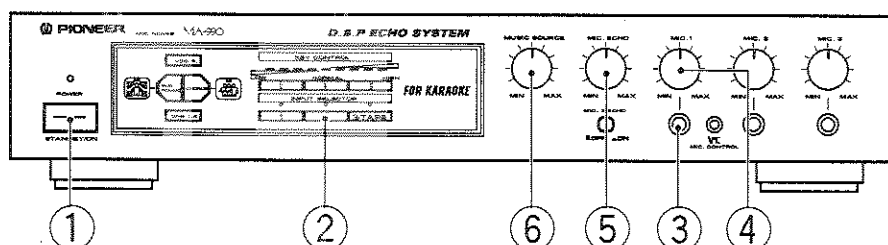
⑬ MIC. inputs

Connect the microphone plug.

For ② and ③, see 'Mood up Functions' on page 6. For ④, ⑤, and ⑥, see "CONVENIENT FUNCTIONS FOR KARAOKE PRACTICING" on page 6.

HOW TO OPERATE

■ To play karaoke with laser disc, video tape, or cassette tape



① Turn on the power switch.

② Set the INPUT SELECTOR button to 1, 2, or 3/TAPE (cassette tape).

③ Connect a microphone and turn on the microphone switch.

④ Adjust the microphone sound volume control.

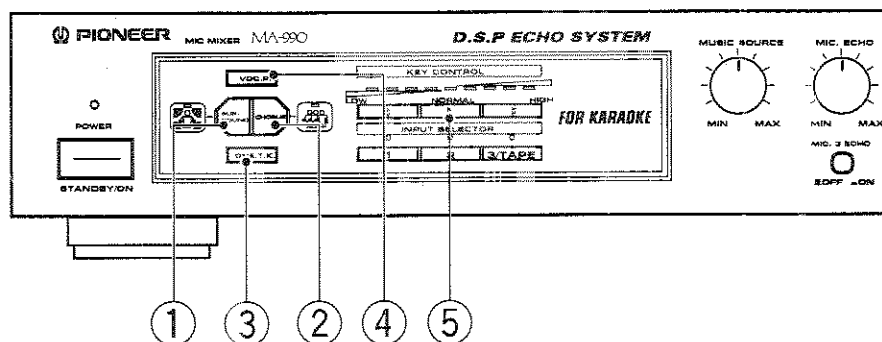
⑤ Adjust the echo effect using the echo control.

⑥ Adjust the music source volume control.

NOTE:

When the power is turned on, 1 is selected automatically.

■ Mood up Functions



① To change the music presentation impression (SURROUND)

Press the SURROUND button, gives the sound impression of a spacious music hall.

② To change the voice impression (CHORUS)

Press the CHORUS button, provides an effect as if singing with two or three people even when singing alone.

NOTE:

When CHORUS is selected, the key control is automatically set to the standard pitch.

When the key control button is pressed at this time, the chorus musical interval can be changed.

■ CONVENIENT FUNCTIONS FOR KARAOKE PRACTICING

③ To change to karaoke play at the touch of button (ONE T. K.)

Press the ONE T. K. (ONE-TOUCH KARAOKE) button, the indicator is lit, the sound volume of the general stereo source vocal is turned down, and you can easily enjoy karaoke-like software. Press again to turn off the indicator and return to the normal mode.

④ To replace the singer's voice with your voice (VOC. P.)

Press the VOC. P. (VOCAL PARTNER) button, the indicator is lit, the singer's voice is replaced with your voice when you sing. For example, you can practice a male part (or female part) of a duet tune and leave the counter part to the original source.

NOTES

- This effect depends on the music source.
- The ONE T. K. indicator light during your singing with microphone indicates that the function is operating normally.
- If MIC. 3 ECHO is set to OFF, VOCAL PARTNER is not available with microphone 3.

⑤ To change music pitch (KEY CONTROL)

Use the key control buttons (#, b, b) to adjust to your own pitch.

#:	Increases the pitch by a half tone each time pressed. (4 steps max.)
b:	Returns to the standard pitch.
b:	Decreases the pitch by a half tone each time pressed. (4 steps max.)

The music pitch can be controlled from the PIONEER remote control microphone (DM-C930, DM-C820 and DM-C530).

NOTE:

Operation of the once-more switch on that microphone is not available on this machine.

TROUBLESHOOTING

Incorrect operations are often mistaken for trouble and malfunctions. If you think something is wrong with this unit, check the points below. Investigate the other components and electrical attachments being used. If the trouble cannot be rectified after the checks listed below, consult your nearest PIONEER authorized service center or your dealer.

Symptom	Cause	Remedy
1 No sound is output.	● The INPUT SELECTOR switch is set to another input source.	● Set the INPUT SELECTOR switch to the corresponding input source.
2 The singer's voice is not replaced with the user's voice if the VOC. P. (VOCAL PARTNER) button is pressed.	● The microphone sound volume is closer to MIN. ● The user's voice is too weak.	● Rotate the microphone volume control toward MAX. ● Sing loudly.
3 The ONE T. K. button has been pressed, but the singer's voice is not turned down.	● The music source being used prevents the singer's voice from being output from the center.	● The singer's voice may not be turned down depending on the music source.
4 Pressing the sharp or flat button does not operate the key control.	● The CHORUS button is set to CHORUS.	● Press the CHORUS button to turn off.
5 Key control cannot be operated from a commercially available microphone.	● The microphone control terminal is not connected. ● The microphone switch is not turned on.	● Connect the microphone to the microphone control terminal. ● Turn the microphone switch on.

SPECIFICATIONS

Input	3 microphone systems 3 audio systems
● Microphone (sensitivity/impedance)	1 mV/20 kΩ
● Audio (sensitivity/impedance)	150 mV/100 kΩ
Output	2 audio systems
● Audio (level/impedance)	150 mV/5 kΩ
Power voltage	AC110V/120–127V/220V/230–240V, 50/60 Hz
Power consumption	14 W
Weight	3.1 kg
Dimensions	420 (W) x 85 (H) x 316 (D) mm (excluding protruding portion)

Accessories	
Operating instructions	1
Audio cord	1

NOTE:
Specifications and design subject to possible modifications without notice, due to improvements.

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